REMARKS

The Present Invention

The present invention is directed to a method of reducing the activity of hyperactive T cells. The method comprises contacting hyperactive T cells selected from the group consisting of tumor antigen-specific, transplant-specific, allergen-specific and virus-specific T cells with at least one proteolytic enzyme selected from trypsin and papain and, optionally, rutoside.

The Pending Claims

Claims 9, 11, 13-19, 21 and 23-28 are currently pending. All of the claims are directed to the method.

The Amendments to the Specification and Claims

The specification has been amended to delete the amino acid sequence on page 12, thereby rendering moot the requirement for a Sequence Listing. The deletion of the amino acid sequence does not adversely affect the sufficiency of disclosure inasmuch as the sequence was know in the art prior to the filing of the German application to which this application claims priority and is available to the public in numerous journal articles; etc. as evidenced by the abstracts obtained through PubMed and submitted herewith.

Claim 9 has been amended to recite the limitation of claim 10, which resulted in the cancellation of claims 10, 12, 20 and 22 and the amendment of the dependencies of those claims which originally depended from the cancelled claims. In addition, claim 9 has been amended to recite "reducing the activity" of hyperactive T cells as supported by the data set forth in the specification. Claims 13-18 have been amended to recite "organism" as supported by the specification at, for example, page 1 and the Examples. Further amendments to claims 13-18 serve to address matters of form. Therefore, no new matter has been added by way of the amendments to the claims.

The Office Action

The Office has set forth the following objection and rejections:

(i) the specification has been objected to for recitation of a sequence on page 12 without compliance with one or more of the requirements under 37 C.F.R. § 1.821-1.825,

(ii) claims 13-18 have been rejected under 35 U.S.C. § 112, second paragraph, as allegedly indefinite,

(iii) claims 9 and 10 have been rejected under 35 U.S.C. § 102(b) as allegedly anticipated by Mynott et al.,

(iv) claims 9 and 10 have been rejected under 35 U.S.C. § 102(b) as allegedly anticipated by Kunze et al.,

(v) claims 9-14, 19 and 20 have been rejected under 35 U.S.C. § 102(b) as allegedly anticipated by Ransberger, and

(vi) claims 9-28 have been rejected under 35 U.S.C. § 103(a) as allegedly obvious in view of and, therefore, unpatentable over Mynott et al., Kunze et al., and Ransberger. Reconsideration of this objection and these rejections is hereby requested.

Discussion of Objection to the Specification

The Office has objected to the specification for recitation of the sequence of amino acids 139-151 of PLP on page 12 of the specification without compliance with one or more of the requirements under 37 C.F.R. § 1.821-1.825. This sequence was known in the art prior to filing of the German application to which this application claims priority, as evidenced by the enclosed PubMed abstracts. Therefore, the amino acid sequence has been deleted from the specification. Accordingly, the objection to the specification is believed to be moot.

Discussion of Rejection under 35 U.S.C. § 112, second paragraph

Claims 13-18 have been rejected under Section 112, second paragraph, as allegedly indefinite. According to the Office, it is unclear how the hyperactive T cells, themselves, are contacted with the specified dose, when the dose is administered to an organism containing the hyperactive T cells. This rejection is believed to be moot in view of the amendments to claims 13-18.

Discussion of Rejections under 35 U.S.C. § 102(b)

Claims 9 and 10 have been rejected under Section 102(b) as allegedly anticipated by Mynott et al. Mynott et al. does not teach, let alone suggest, the use of trypsin or papain as recited in claim 9, and claim 10 has been canceled. Therefore, this rejection should be withdrawn.

Claims 9 and 10 also have been rejected under Section 102(b) as allegedly anticipated by Kunze et al. Kunze et al. does not teach the administration of papain and/or trypsin to reduce the activity of hyperactive T cells. Therefore, Kunze et al. cannot be said to anticipate the rejected claims, and the rejection under Section 102(b) should be withdrawn.

Claims 9-14, 19 and 20 have been rejected under Section 102(b) as allegedly anticipated by Ransberger. Ransberger does not teach the administration of papain and/or trypsin, alone or in further combination with bromelain, rutoside, and/or α_2-macroglobulin, to reduce the activity of hyperactive T cells. Therefore, Ransberger cannot be said to anticipate the rejected claims, and the rejection under Section 102(b) should be withdrawn.

Discussion of Rejection under 35 U.S.C. § 103(a)

Claims 9-28 have been rejected under Section 103(a) as allegedly obvious in view of and, therefore, unpatentable over Mynott et al., Kunze et al. and Ransberger. The cited references, whether taken alone or in various combinations, neither teach, nor reasonably suggest, the administration of papain and/or trypsin, alone or in further combination with bromelain, rutoside, and/or α_2-macroglobulin, to reduce the activity of hyperactive T cells. Therefore, the cited references cannot be said to render obvious the rejected claims, and the rejection under Section 103(a) should be withdrawn.

Conclusion

In view of the above remarks, the application is considered to be in good and proper form for allowance and the Office is respectfully requested to pass this application to issuance. If, in the opinion of the Office, a telephone conference would expedite the prosecution of the instant application, the Office is invited to contact the undersigned attorney.

Respectfully submitted,

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